

## RAW SEQUENCE LISTING

The Biotechnology Systems Branch of the Scientific and Technical  
Information Center (STIC) no errors detected.

Application Serial Number: 10/722,903A  
Source: IFUHO  
Date Processed by STIC: 1-3-05

# ***ENTERED***



IFWO

## RAW SEQUENCE LISTING

DATE: 01/03/2005

PATENT APPLICATION: US/10/722,903A

TIME: 14:53:52

Input Set : A:\Sequence Listing.txt

Output Set: N:\CRF4\01032005\J722903A.raw

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3 <110> APPLICANT: GTC Biotherapeutics, Inc.
5 <120> TITLE OF INVENTION: Modified Antibodies Stably Produced in Milk and Methods of
6   Producing Same
8 <130> FILE REFERENCE: GTC-53
10 <140> CURRENT APPLICATION NUMBER: 10/722,903A
11 <141> CURRENT FILING DATE: 2003-11-26
13 <150> PRIOR APPLICATION NUMBER: US 60/429,606
14 <151> PRIOR FILING DATE: 2002-11-27
16 <160> NUMBER OF SEQ ID NOS: 11
18 <170> SOFTWARE: PatentIn version 3.2
20 <210> SEQ ID NO: 1
21 <211> LENGTH: 2028
22 <212> TYPE: DNA
23 <213> ORGANISM: Homo sapiens
26 <220> FEATURE:
27 <221> NAME/KEY: misc_feature
28 <223> OTHER INFORMATION: Human Ig germline H-chain G-E-A region B: gamma-4 constant
29   region, 3' end
31 <400> SEQUENCE: 1
32 agctttctgg ggcaggccgg gcctgacttt ggctgggggc agggaggggg ctaaggtgac      60
34 gcaggtggcg ccagccaggt gcacacccaa tgcccatgag ccagacact ggacctgca      120
36 tggaccatcg cggatagaca agaaccgagg ggccctctcg ccctgggccc agctctgtcc      180
38 cacaccgchg tcacatggca ccacctctct tgcagcttcc accaagggcc catccgtctt      240
40 ccccttgchg ccctgtcca ggagcacctc cgagagcaca gccgccctgg gctgcctggg      300
42 caaggactac ttccccgaac cggtgacggt gtcgtggaac tcaggcgccc tgaccagcgg      360
44 cgtgcacacc ttcccggtg tccctacagt ctcaggactc tactccctca gcagcgtggg      420
46 gaccgtgccc tccagcagct tgggcacgaa gacctacacc tgcaacgtag atcacaagcc      480
48 cagcaacacc aaggtggaca agagagttgg tgagaggcca gcacagggag ggagggtgtc      540
50 tgctggaagc caggctcagc cctcctgcct ggacgcaccc cggtgtgca gcccagccc      600
52 agggcagcaa ggcattgccc atctgtctcc tcaccggagg gcctctgacc acccactca      660
54 tgctcaggga gagggctctt tggatttttc caccaggctc ccggcaccac aggttgatg      720
56 cccctacccc aggcctgchg catacagggc aggtgctgch ctacagactg ccaagagcca      780
58 tatccgggag gacctgccc ctgacctaaag cccaccccaa aggccaaact ctccactccc      840
60 tcagctcaga caccttctct cctcccagat ctgagtaact cccaatcttc tctctgcaga      900
62 gtccaaatat ggtcccccat gcccatcatg ccaggttaag ccaaccagg cctcgccctc      960
64 cagctcaagg cgggacaggt gccctagagt agcctgcata cagggacagg cccagcccg      1020
66 gtgctgacgc atccacctcc atctcttct cagcacctga gttcctgggg ggaccatcag      1080
68 tcttctgtt cccccaaaa cccaaggaca ctctcatgat ctcccgacc cctgaggtca      1140
70 cgtgcgtggg ggtggacgtg agccaggaag accccgaggt ccagttcaac tggtagctgg      1200
72 atggcgtgga ggtgcataat gcccaagacaa agccgcggga ggagcagttc aacagcacgt      1260
74 accgtgtggg cagegtcttc accgtcctgc accaggactg gctgaacggc aaggagtaca      1320
76 agtgcaaggt ctccaacaaa ggctcccggt cctccatcga gaaaaccatc tccaaagcca      1380
78 aaggtgggac ccacggggtg cgagggccac acggacagag gccagctcgg cccacctct      1440

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80 gccctgggag tgaccgctgt gccaacctct gtccctacag ggcagccccg agagccacag 1500
82 gtgtacaccc tgcccccatc ccaggaggag atgaccaaga accaggtcag cctgacctgc 1560
84 ctgggtcaaa gcttctaccc cagcgacatc gccgtggagt gggagagcaa tgggcagccg 1620
86 gagaacaact acaagaccac gcctcccgtg ctggactccg acggctcctt cttcctctac 1680
88 agcaggctaa cegtggacaa gagcagggtg caggagggga atgtttctc atgctccgtg 1740
90 atgcatgagg ctctgcacaa ccactacaca cagaagagcc tctccctgtc tctgggtaaa 1800
92 tgagtgccag ggccggcaag cccccgtcc cggggctctc ggggtcgcgc gaggatgctt 1860
94 ggcacgtacc cgtctacat acttcccagg caccagcat ggaaataaag caccaccac 1920
96 tgccctgggc ccctgtgaga ctgtgatggt tctttccacg ggtcaggccg agtctgaggc 1980
98 ctgagtgaca tgagggaggc agagcgggtc ccactgtccc cacactgg 2028
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102 <211> LENGTH: 61
103 <212> TYPE: DNA
104 <213> ORGANISM: Homo sapiens
107 <220> FEATURE:
108 <221> NAME/KEY: misc_feature
109 <223> OTHER INFORMATION: IgG4 Hinge Region Nucleic Acid
111 <400> SEQUENCE: 2
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114 t 61
117 <210> SEQ ID NO: 3
118 <211> LENGTH: 12
119 <212> TYPE: PRT
120 <213> ORGANISM: Homo sapiens
123 <220> FEATURE:
124 <221> NAME/KEY: misc_feature
125 <223> OTHER INFORMATION: IgG4 Hinge Region Amino Acid
127 <400> SEQUENCE: 3
129 Glu Ser Lys Tyr Gly Pro Pro Cys Pro Ser Cys Pro
130 1 5 10
133 <210> SEQ ID NO: 4
134 <211> LENGTH: 33
135 <212> TYPE: DNA
136 <213> ORGANISM: artificial sequence
139 <220> FEATURE:
140 <221> NAME/KEY: misc_feature
141 <223> OTHER INFORMATION: S241P Oligo Nucleic Acid
143 <400> SEQUENCE: 4
144 ggtcccccat gtctccctg cccaggtaag cca 33
147 <210> SEQ ID NO: 5
148 <211> LENGTH: 11
149 <212> TYPE: PRT
150 <213> ORGANISM: artificial sequence
153 <220> FEATURE:
154 <221> NAME/KEY: misc_feature
155 <223> OTHER INFORMATION: S241P Oligo Amino Acid
157 <400> SEQUENCE: 5
159 Gly Pro Pro Cys Pro Pro Cys Pro Gly Lys Pro
160 1 5 10

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163 <210> SEQ ID NO: 6
164 <211> LENGTH: 65
165 <212> TYPE: DNA
166 <213> ORGANISM: Homo sapiens
169 <220> FEATURE:
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171 <223> OTHER INFORMATION: IgG4 Hinge Region Nucleic Acid
173 <400> SEQUENCE: 6
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176 caggc                                                                    65
179 <210> SEQ ID NO: 7
180 <211> LENGTH: 12
181 <212> TYPE: PRT
182 <213> ORGANISM: Homo sapiens
185 <220> FEATURE:
186 <221> NAME/KEY: misc_feature
187 <223> OTHER INFORMATION: IgG4 Hinge Region Amino Acid
189 <400> SEQUENCE: 7
191 Glu Ser Lys Tyr Gly Pro Pro Cys Pro Ser Cys Pro
192 1          5          10
195 <210> SEQ ID NO: 8
196 <211> LENGTH: 65
197 <212> TYPE: DNA
198 <213> ORGANISM: Homo sapiens
201 <220> FEATURE:
202 <221> NAME/KEY: misc_feature
203 <223> OTHER INFORMATION: IgG2 Hinge Region Nucleic Acid
205 <400> SEQUENCE: 8
206 cttctctctg cagagcgcaa atgttgtgtc gagtgccac cgtgcccagg tccgccaacc      60
208 caggc                                                                    65
211 <210> SEQ ID NO: 9
212 <211> LENGTH: 12
213 <212> TYPE: PRT
214 <213> ORGANISM: Homo sapiens
217 <220> FEATURE:
218 <221> NAME/KEY: misc_feature
219 <223> OTHER INFORMATION: IgG2 Hinge Region Amino Acid
221 <400> SEQUENCE: 9
223 Glu Arg Lys Cys Cys Val Glu Cys Pro Pro Cys Pro
224 1          5          10
227 <210> SEQ ID NO: 10
228 <211> LENGTH: 33
229 <212> TYPE: DNA
230 <213> ORGANISM: artificial sequence
233 <220> FEATURE:
234 <221> NAME/KEY: misc_feature
235 <223> OTHER INFORMATION: Oligo 2014 Nucleic Acid
237 <400> SEQUENCE: 10
238 gaggagcagt tccagtctac ttaccgagtg gtc                                33

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241 <210> SEQ ID NO: 11  
242 <211> LENGTH: 11  
243 <212> TYPE: PRT  
244 <213> ORGANISM: artificial sequence  
247 <220> FEATURE:  
248 <221> NAME/KEY: misc\_feature  
249 <223> OTHER INFORMATION: Oligo 2014 Amino Acid  
251 <400> SEQUENCE: 11  
253 Glu Glu Gln Phe Gln Ser Thr Tyr Arg Val Val  
254 1 5 10

VERIFICATION SUMMARY

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